[illegible]

www.huawei.com

[illegible] © 2018 [illegible]

[illegible]

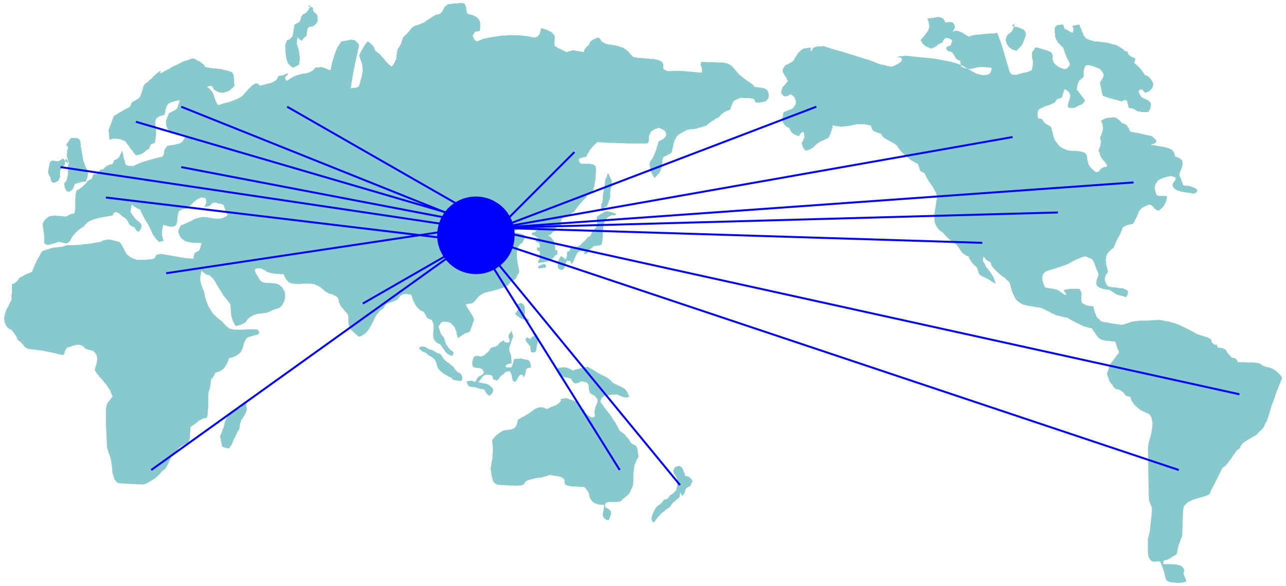
- [illegible]:
  - [illegible] NAT [illegible]
  - [illegible] NAT [illegible]
  - [illegible] NAT [illegible]

[illegible]

1. [illegible]
2. [illegible]NAT[illegible]
3. [illegible]
4. NAT[illegible]

NAT [illegible]

- IPv4 [illegible]
- IPv6 [illegible]
- [illegible] IPv4 [illegible] NAT [illegible]



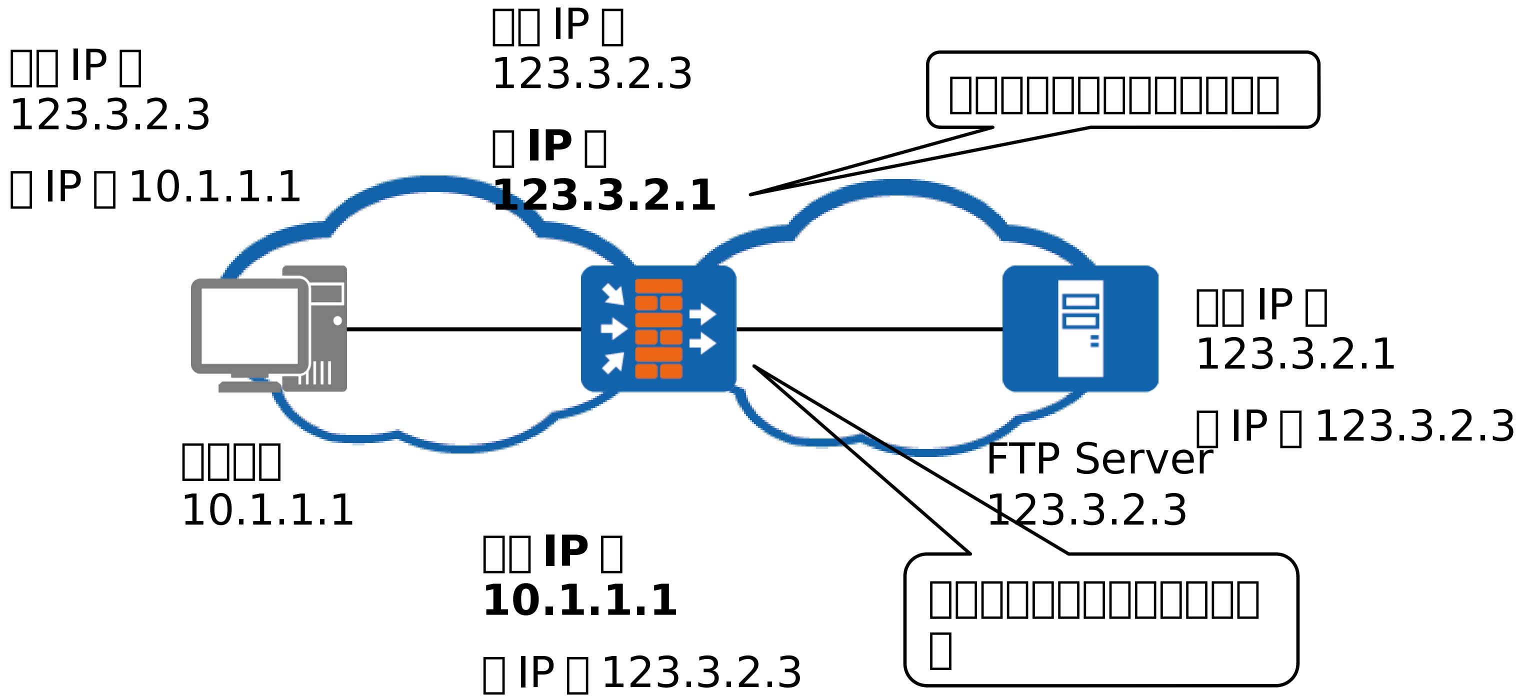
NAT [illegible]

- [illegible]
  - [illegible] IP [illegible]
  - [illegible]
  - [illegible]
  - [illegible]
- [illegible]
  - [illegible]
  - [illegible]

[illegible] © 2018 [illegible]

NAT □□□□□□

- NAT □□□□ IP □□□□□□□□□□□□□□□□□□□□□ IP □□□□ □□□□□ IP □□□□□□□



NAT □□

□ NAT

- □□□□□
- □□□□□□□□ Easy IP □

□□□□□

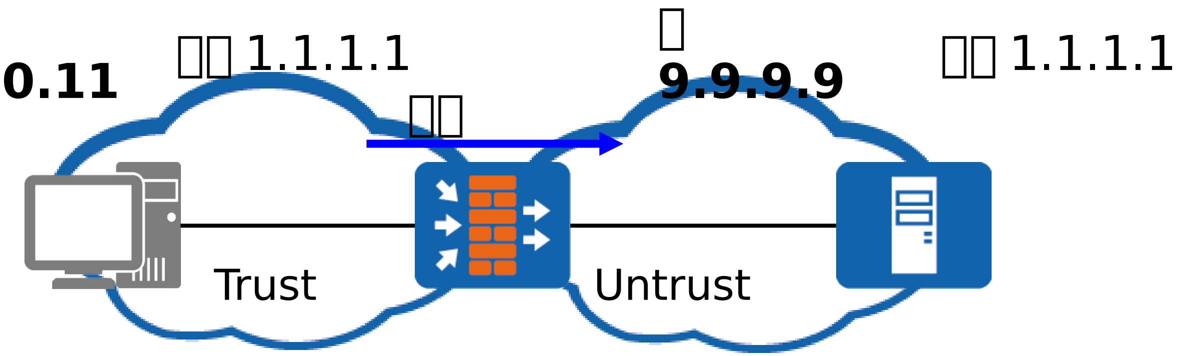
- □□□□□ NAT server □

[illegible]

1. [illegible]
2. **[illegible] NAT [illegible]**
3. [illegible]
4. NAT [illegible]

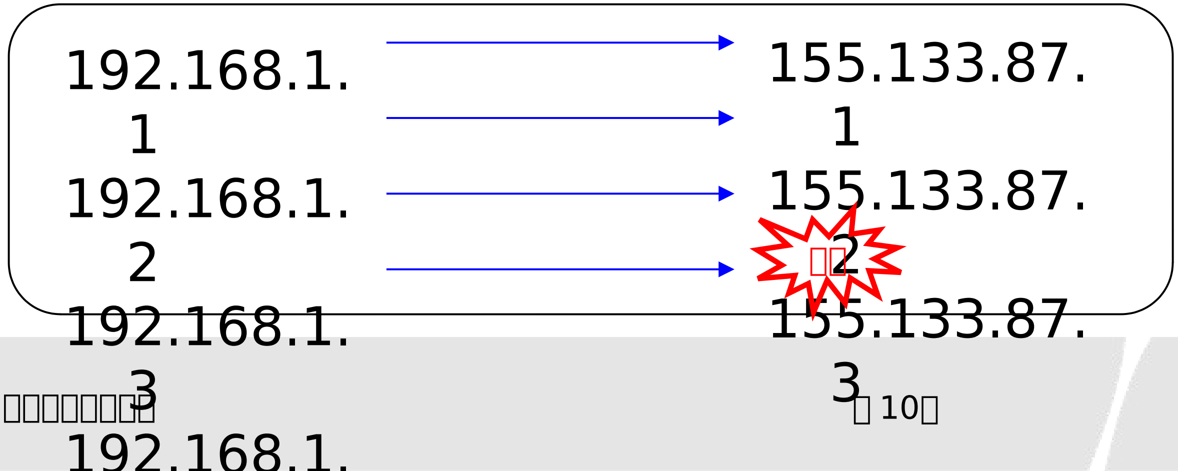
□ NAT □□□□□ (1)

- □□□□□□□□□□□□□□



□
192.168.0.11
□□ 1.1.1.1
□
9.9.9.9
□□ 1.1.1.1
□□
Trust
Untrust

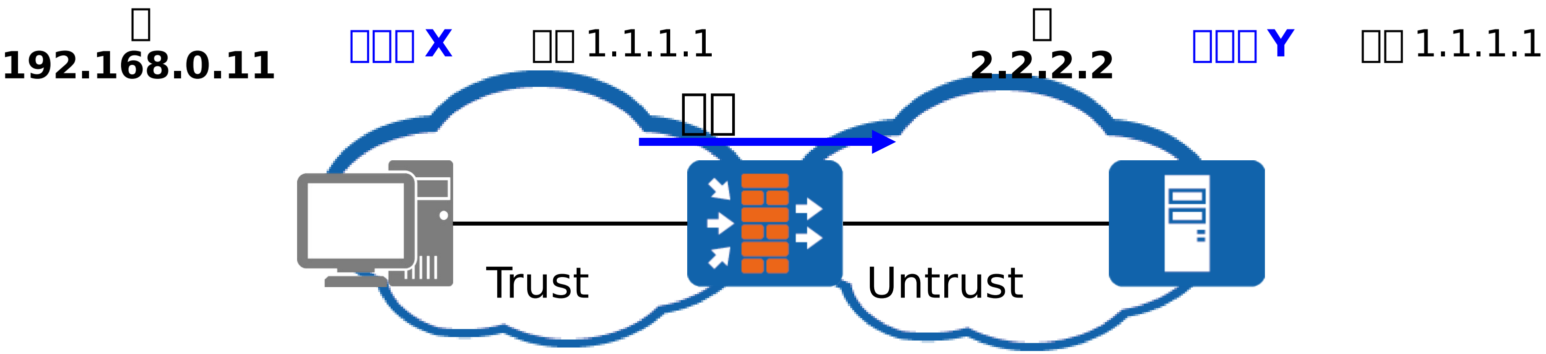
- □□□□□□□□□ IP □□□□□□□□□□□□□□□



192.168.1.1
192.168.1.2
192.168.1.3
192.168.1.
155.133.87.1
155.133.87.2
155.133.87.3
□□

□NAT□□□□□ (2)

- □□□□□□□□□□□□

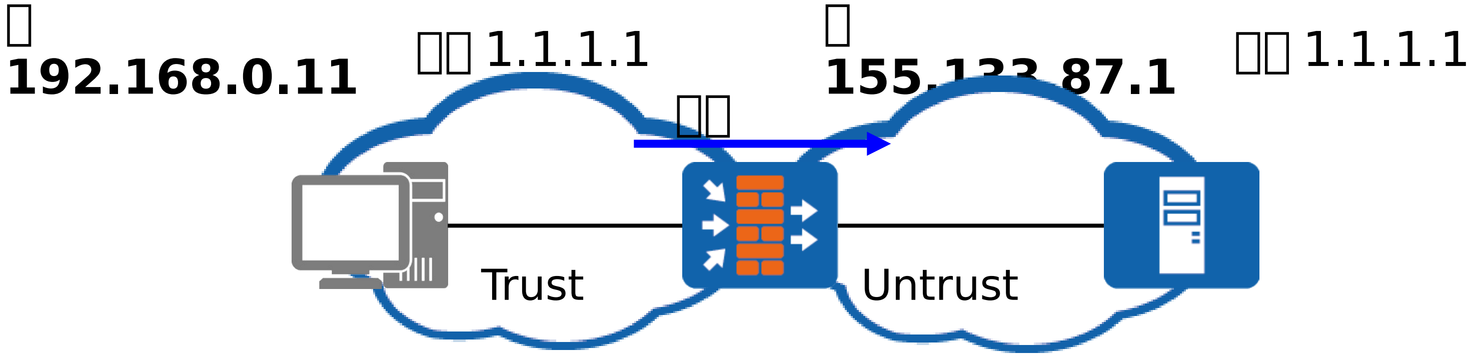


- □□□□□□□□□□□□□□□□□□□□□□□□□□□□□□□□□□□

192.168.1.1	155.133.87.1□7111
192.168.1.2	155.133.87.1□7112
192.168.1.3	155.133.87.1□7113

Easy IP

- □□□□□□□(Easy IP)□

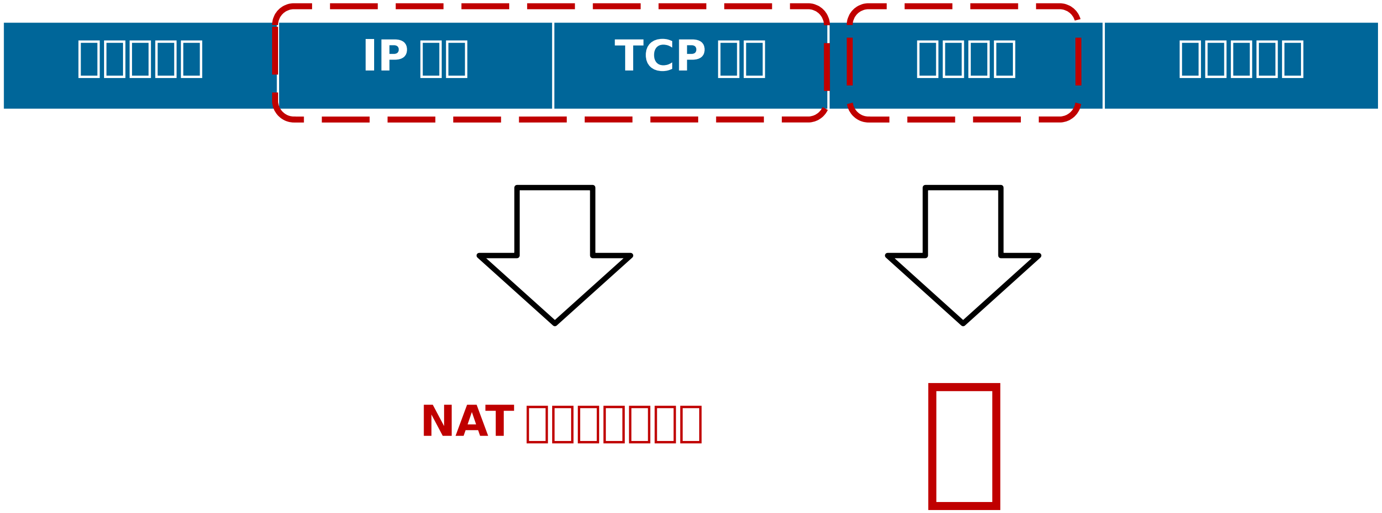


192.168.1.1 → 155.133.87.1□7111
192.168.1.2 → 155.133.87.1□7112
192.168.1.3 → 155.133.87.1□7113

NAT ALG

- NAT ALG [illegible] Application Level Gateway [illegible]

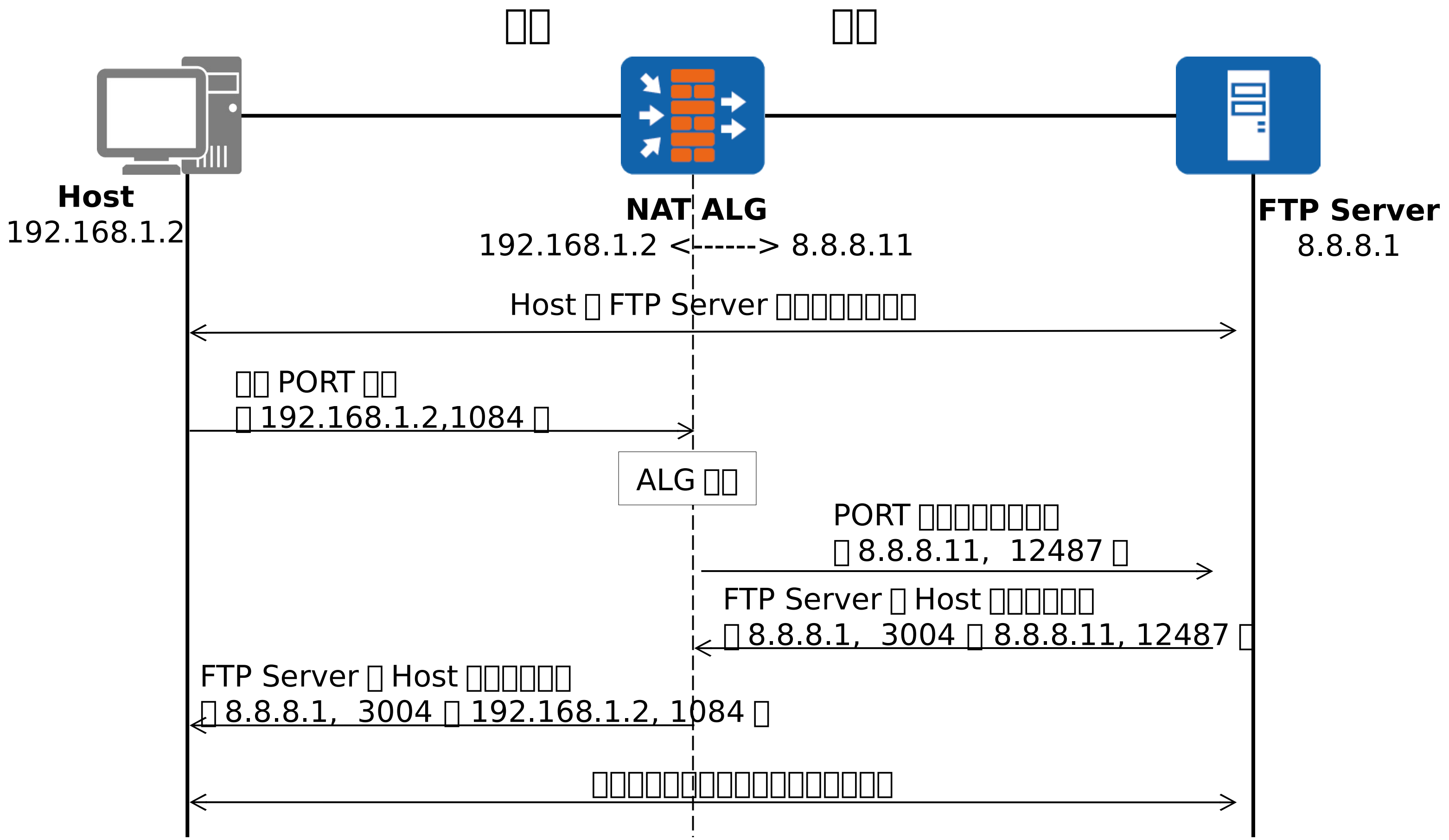
  [illegible]



HUAWEI

NAT ALG □□□□

- FTP □□□□□□ NAT ALG □□□



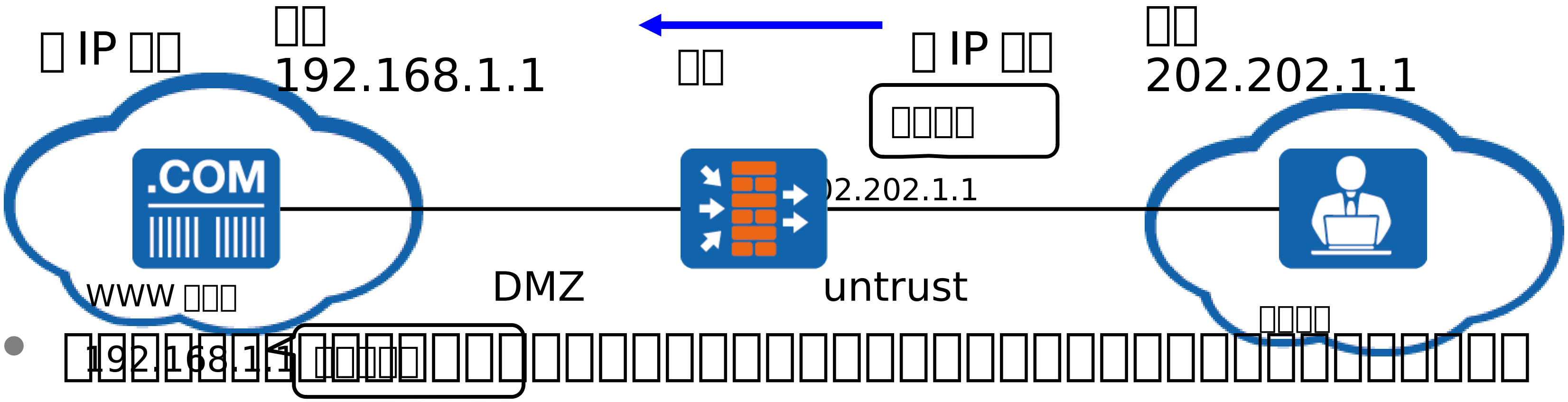
□□□□ © 2018 □□□□□□□□

[illegible]

1. [illegible]
2. [illegible] NAT [illegible]
3. **[illegible]**
4. NAT [illegible]

NAT Server - [illegible]

- [illegible] (Nat Server) [illegible]



- [illegible]
  [illegible]

NAT Server □ Server Map □ (1)

- □□ NAT Server □□□□□□□□□□ Server-map □□□□□□□□ Global □□□ Inside □□□□□□□□□

```
[NGFW]nat server server1  protocol  tcp  global 202.202.1.1  inside 192.168.1.1
```

- □□□ server map □□

```
Type□ Nat Server, ANY ->202.202.1.1:21[192.168.1.1:21],
Zone:---,protocol:tcp
Vpn: public --> public
Type□ Nat Server Reverse, 192.168.1.1[202.202.1.1] -> ANY,
Zone:---□protocol:tcp Vpn: public --> public, counter: 1
```

□□□□ © 2018 □□□□□□□□

NAT Server □ Server Map □ (2)

- □□ no-reverse □□□□□□□□□□ Server-map □□□□□□□□

```
[NGFW]nat server server1  protocol  tcp  global 202.202.1.1  inside
192.168.1.1 no-reverse
```

- □□□ server map □□

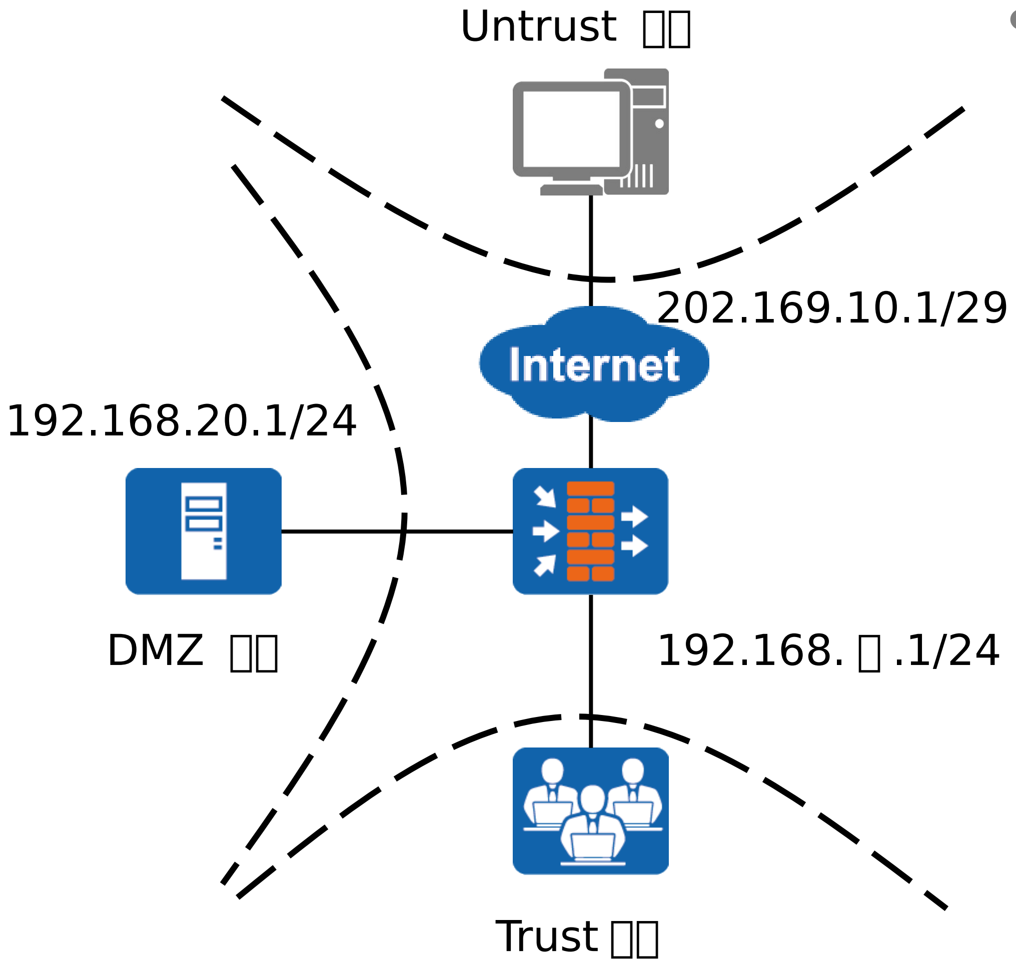
```
Type: Nat Server,  ANY -> 202.202.1.1[192.168.1.1],  Zone:---,
protocol:tcp
Vpn: public -> public
```

□□□□ © 2018 □□□□□□□□

[illegible]

1. [illegible]
2. [illegible] NAT [illegible]
3. [illegible]
4. **NAT [illegible]**

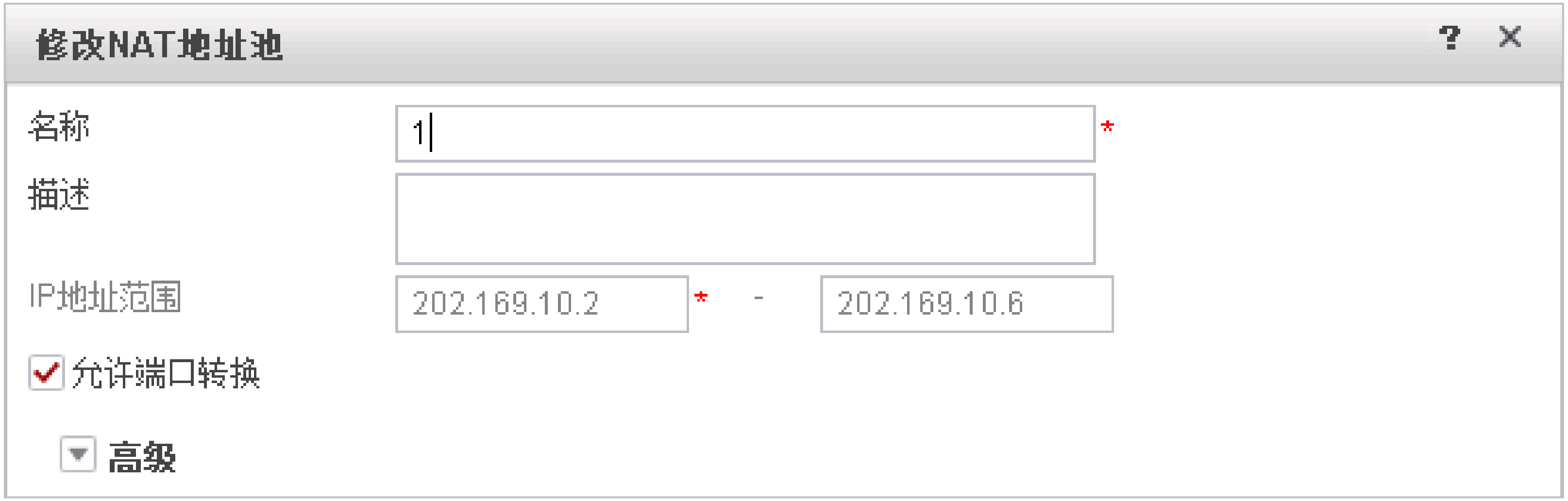
NAT □□□□□□□□□□□□



- □□□□□□
  - □□□
  - NAT Server □□

□□□□ NAT □□（WEB）

- □□ NAT □□□□



□□□□ NAT □□（WEB）

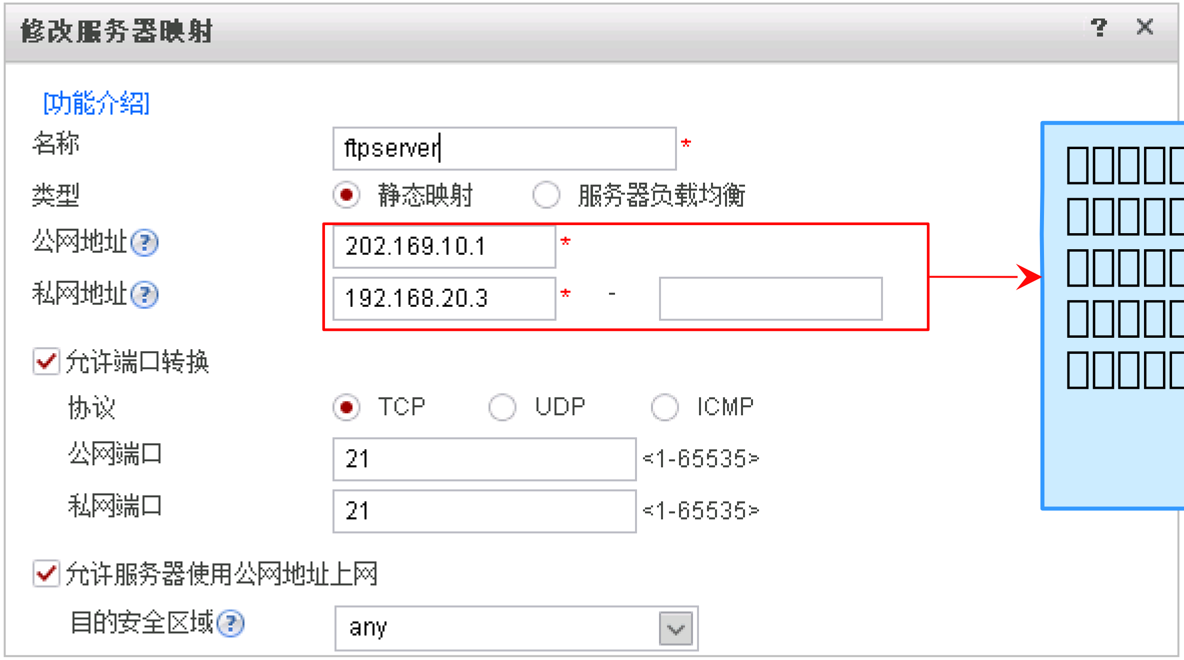
- □□□ NAT □□□

□□□□□□□□□ trust
□□□□□□□□ untrust
□□ internet □□□□
□□□□□□□□□ trust □
□□□□□□□□
untrust □

□□□□□□□□□

□□□ NAT Server □□ (WEB)

- □□□□ Web □ FTP □□□□



□□□□□□□□□□
□□□□□□□□□□
□□□□□□ IP □
□□□□□□□□□□
□□□□□□

□□□□ © 2018 □□□□□□□□

□□□ NAT Server □□（WEB)

- □□□□□□□□□□□□

- HTTP □□□□□□□□

□□□□ © 2018 □□□□□□□□

□□□□ NAT □□ (CLI)

- □□□□□□□□□
- □□□□□□ 192.168.0.0 □□□□□□□□□□□□□
- □□□□□□

```
[NGFW] nat address-group 1
[NGFW -nat-address-group-1] section 202.169.10.2 202.169.10.6
```

- □□□ NAT □□□

```
[NGFW] nat-policy
[NGFW-policy-nat] rule name nat1
[NGFW-policy-nat-rule-nat1] source-zone trust
[NGFW-policy-nat-rule-nat1] destination-zone untrust
[NGFW-policy-nat-rule-nat1] source-address 192.168.0.0 24
[NGFW-policy-nat-rule-nat1] action nat address-group 1
```

□□□□ © 2018 □□□□□□□

□□□ NAT Server □□ (CLI)

- □□□□ Web □ FTP □□□□

```
[USG] nat server wwwserver protocol tcp global 202.169.10.1 80 inside
192.168.20.2 8080
[USG] nat server ftpserver protocol tcp global 202.169.10.1 ftp inside
192.168.20.3 ftp
```

- □□□□□□□□□□□□

```
[USG] security-policy
[USG -policy-security] rule name p1
[USG -policy-security-rule-p1] source-zone untrust
[USG -policy-security-rule-p1] destination-zone dmz
[USG -policy-security-rule-p1] destination-address 192.168.20.2 32
[USG -policy-security-rule-p1] service http
[USG -policy-security-rule-p1] action permit
[USG -policy-security] rule name p2
[USG -policy-security-rule-p2] source-zone untrust
[USG -policy-security-rule-p2] destination-zone dmz
[USG -policy-security-rule-p2] destination-address 192.168.20.3 32
[USG -policy-security-rule-p2] service ftp
[USG -policy-security-rule-p2] action permit
```

□□□□ © 2018 □□□□□□□□

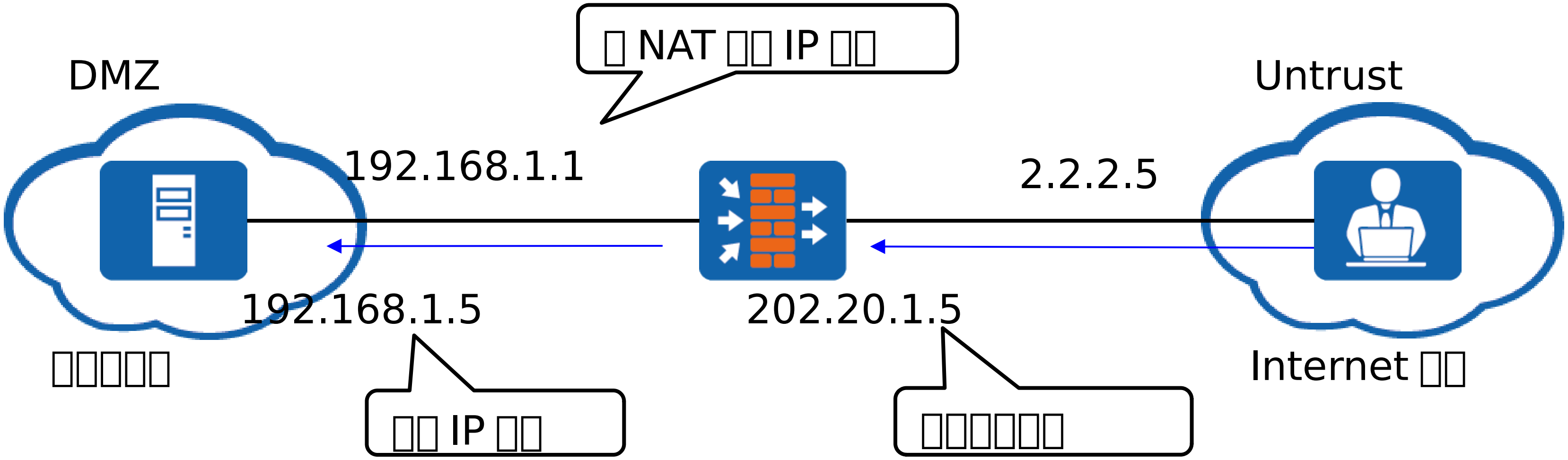
□□NAT□□

- □□NAT□□□□□□ :
  - NAT Server + □NAT
  - □□NAT

□□□□© 2018 □□□□□□□□

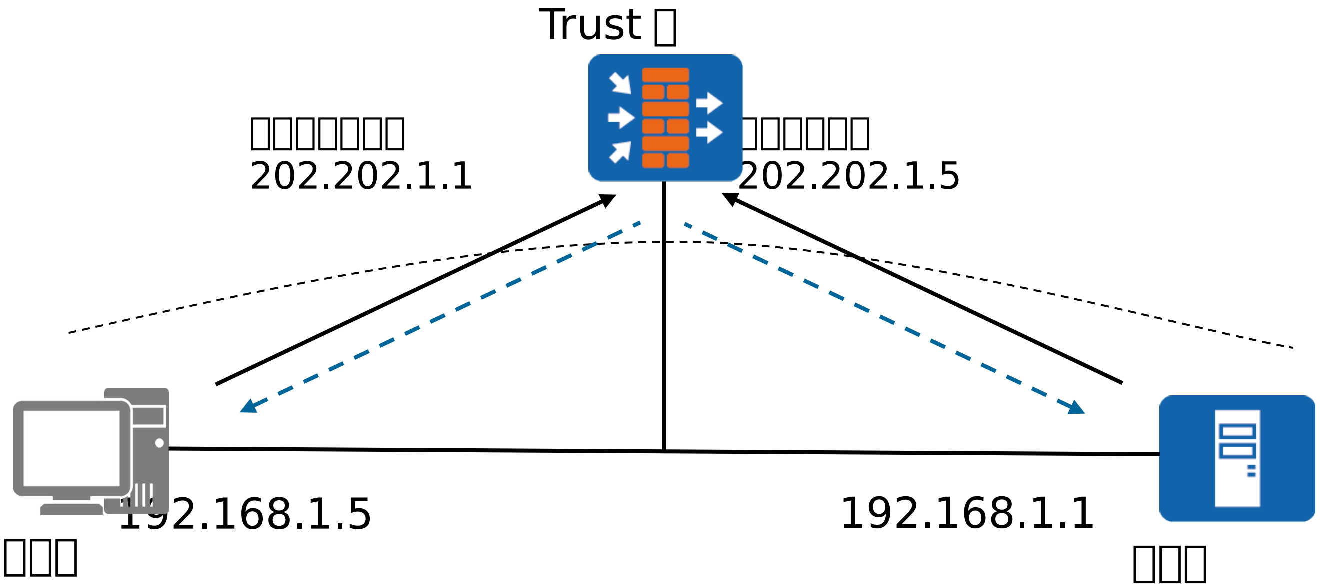
□□□□ NAT

- □□□□□□□□□□□□□□□□□□ NAT Server □□□□□□□ NAT □□□



[illegible] NAT

- [illegible] FTP [illegible] IP [illegible] IP [illegible]
- [illegible] FTP [illegible] IP [illegible]



[illegible]

1. [illegible]NAT[illegible]( )

   A. IP[illegible]

   B. [illegible]IP[illegible]

   C. [illegible]

   D. [illegible]

[illegible]

- NAT [illegible]
- NAT [illegible]
- [illegible] NAT [illegible]

[illegible] © 2018 [illegible]

www.huawei.com